

**MULTI-LAYER Pt ELECTRODE FOR DRAM AND FRAM
WITH HIGH K DIELECTRIC MATERIALS**

5 ABSTRACT

A multi-layer electrode (246) and method of fabrication thereof in which a conductive region (244) is separated from a barrier layer (222) by a first conductive liner (240) and a second conductive liner (242). First conductive layer (240) comprises Pt, and second conductive liner (242) comprises a thin layer of conductive oxide. The multi-layer electrode (246) prevents oxygen diffusion through the top conductive region (244) and reduces material variation during electrode patterning.